

FORM NO. 51-4AA
FEB 1952

CLASSIFICATION. SECRET/CONTROL - U.S. OFFICIALS ONLY
SECURITY INFORMATION

25X1

25X1

CD NO.

DATE DISTR. 16 April 1952

NO. OF PAGES 1

NO. OF ENCLS.
(LISTED BELOW) 1

SUPPLEMENT TO
REPORT NO.

REF ID: A66582

DO NOT CIRCULATE

THIS DOCUMENT CONTAINS INFORMATION AFFECTING THE NATIONAL DEFENSE OF THE UNITED STATES, WITHIN THE MEANING OF TITLE 18, SECTIONS 793 AND 794, OF THE U.S. CODE, AS AMENDED. ITS TRANSMISSION OR REVELATION OF ITS CONTENTS TO OR RECEIPT BY AN UNAUTHORIZED PERSON IS PROHIBITED BY LAW. THE REPRODUCTION OF THIS FORM IS PROHIBITED.

THIS IS UNEVALUATED INFORMATION

25X1

1. At Mechanik Askania VVB VEB, at Teltow near Berlin, work is progressing slowly on the design of a machine for balancing automatically gyroscope rotors. Experiments have shown that it is impracticable to sputter metal onto the rotor in vacuo, and attempts are now being made to sputter at atmospheric pressure. A spark discharge from a condenser, controlled by a Tesla transformer is being used. Great difficulty is being encountered in designing a mechanism which will interpret correctly the oscillations of the unbalanced rotor, and control the sputtering at the correct places. Experiments in this connection, and research into the quantities of metal deposited by sputtering are being conducted by Boer in the Second Physical Institute, Humboldt (Berlin) University. Dipl. Ing. Hanebuth, Dipl. Ing. Behrmann, Dipl. Ing. Rother and Neubert are working on these problems in the Askania factory. The project is known as AM 6000 (AM = Auswucht-Maschine). The Russians show considerable interest in the progress of the work.
2. The factory is trying to develop an improved version of the Thompson sounding lead.
3. The factory has almost perfected a new type of portable gravimeter. The vertical movements of a float submerged in silicon oil and kept in position by a quartz spring vary the distance between the two plates of a condenser. The capacity of this condenser is therefore a measure of the gravitational field strength. The condenser is zeroed by adjusting the current through an electromagnet.

SECRET/CONTROL - U.S. OFFICIALS ONLY

STATE	X	NAVY	X	NSRB		DISTRIBUTION					
ARMY	X	AIR	X	FBI							

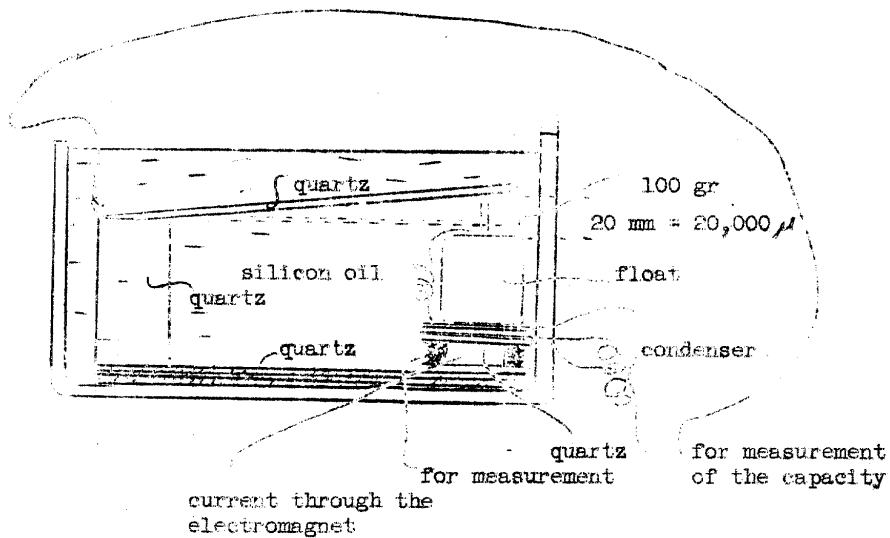
25X1

25X1

SECRET/CONTROL - U.S. OFFICIALS ONLY

Attachment

Hydrostatic-magnetic Gravimeter



1 milligal (sic) = 10^{-6} 20 mm
= 20 μ (sic)

SECRET/CONTROL - U.S. OFFICIALS ONLY